



Wind Powering America Program Overview

Wind Powering America Fact Sheet Series

This fact sheet provides an overview of the U.S. Department of Energy's Wind Powering America program.

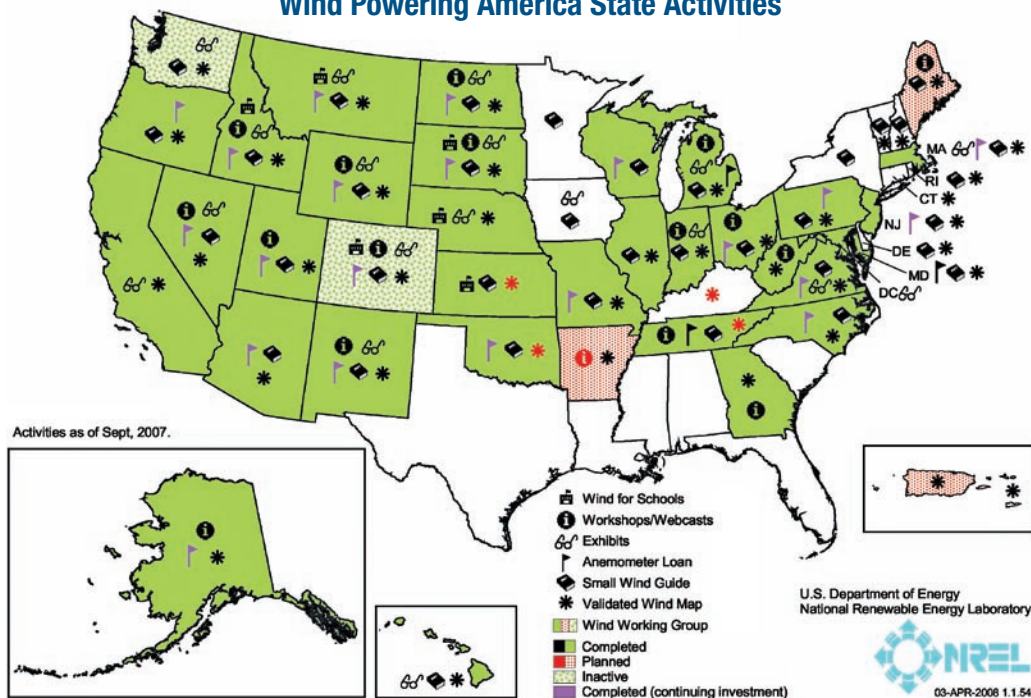
When the Wind Powering America (WPA) partnership was launched in 2000, there were 2,500 megawatts (MW) of installed wind capacity in the United States. By the end of 2007, the U.S. installed capacity exceeded 16,000 MW, and 17 states now have more than 100 MW installed. According to the President's 2006 Advanced Energy Initiative, areas with good wind resources have the potential to provide up to 20% of our nation's electrical supply. WPA works to make this a reality by focusing on six program areas: state-based activities, rural economic development, public power partnerships, wind power for Native Americans, wind for schools, and distributed wind.

State- and Regional-Based Activities

WPA adopts state and regional approaches to promoting wind energy, focusing its efforts on states with good wind resource potential but little wind energy development and assisting with the formation and equipping of state wind working groups. The groups provide stakeholders with timely, accurate information on the current state of wind technology, economics, wind resources, economic development impacts, policy options, issues, and barriers to wind development. Group members include landowners and agricultural sector representatives, county commissioners and rural development specialists, utilities and regulators, colleges and universities, advocacy groups, and state and local groups. WPA now has 33 state wind working groups, with three more in foundation stages.

WPA also formed three Regional Wind Energy Institutes (RWEIs) to educate and train stakeholders to present the wind energy story to state stakeholder groups. The Southwest RWEI focuses on Arizona, Nevada, and Utah, and includes Colorado and New Mexico. The Mid-Atlantic/Southeast RWEI focuses on Maryland, North Carolina, Virginia, and includes West Virginia and Tennessee. The Great Lakes RWEI focuses on Indiana, Michigan, Ohio, and Wisconsin, and includes Minnesota, Pennsylvania, and Illinois.

Wind Powering America State Activities



Rural Economic Development

Rising energy and fertilizer costs, drought, and declining job numbers are just some of the economic issues faced by rural communities nationwide. A robust wind future of 300 gigawatts



U.S. Department of Energy

Energy Efficiency and Renewable Energy

Bringing you a prosperous future where energy is clean, abundant, reliable, and affordable



(GW) would result in \$400 billion of economic development and 180,000 new jobs. To educate rural stakeholders about the benefits of wind energy development, WPA works with rural community leaders, U.S. Department of Agriculture local and national representatives, state and local officials, the Farm Bureau, the Farmers' Union, 25x'25, representatives of the American Corn Growers Foundation and other growers' associations, agricultural schools, the National Association of Counties, and the local financial communities.

Public Power Partnerships

To accelerate industry growth, WPA partners with utilities and utility groups like the American Public Power Association (APPA), the National Rural Electric Cooperative Association (NRECA), power marketing administrations such as Western Area Power Administration, the National Wind Coordinating Collaborative (NWCC), and the Utility Wind Integration Group (UWIG). Power partnership activities include co-sponsorship of wind energy meetings, conferences, and workshops; development of wind energy grid-impact models; development and distribution of technical and market-specific information; and technical assistance on wind energy technologies, economics, and how to begin a wind project.

In recognition of the efforts of its utility partners, the U.S. Department of Energy and WPA present two national annual awards: Wind Cooperative of the Year in conjunction with NRECA and the Wind Municipal Utility of the Year in conjunction with the APPA.

Wind Power for Native Americans

The United States is home to more than 700 Native American tribes located on 96 million acres, and much of this land has excellent wind resources that could be commercially developed to provide electricity and revenue to the reservations. Some issues must be resolved before these resources can be fully realized, including lack of wind resource data, tribal utility policies, perceived developer risk, limited loads, investment capital, technical expertise, and transmission to markets. To support the development of Native American wind resources, WPA provides a wide range of technical assistance and outreach activities to more than 20 tribes from 13 states, including an anemometer loan program, an annual training session, and a quarterly newsletter.

Wind for Schools

WPA is engaging rural America at the grassroots level in a wind energy discussion while developing a knowledge base through its Wind for Schools project. The project's objectives are to 1) engage rural school teachers and students in wind energy, 2) educate college students in wind energy applications, which will equip engineers for the growing U.S. wind industry, and 3) introduce wind energy to rural communities, initiating a discussion of wind energy's benefits and challenges.

To accomplish these objectives, eight entities are involved in each Wind for Schools project: the school (which includes a science teacher, the school administration, and the community); a Wind Application Center; a state facilitator; WPA/NREL/DOE; a green tag marketer and sponsoring company; a wind turbine manufacturer; the local utility or electric cooperative; and the state energy office. WPA launched its first Wind for Schools project in Colorado in 2006 and expanded its Wind for Schools pilot effort in Colorado to Nebraska, Kansas, South Dakota, Montana, and Idaho and plans to expand it to four additional states in 2008.

Distributed Wind

As traditional fuel prices escalate and power supplies fluctuate, more rural landowners, small businesses, and homeowners are considering small wind systems to supply all or a part of their electricity needs. Small wind systems can boost local energy supplies and stimulate rural economies. Gaining acceptance for and encouraging the use of small wind systems is another integral element of WPA's technology assistance and outreach efforts. WPA publishes *Small Wind Electric Systems: A U.S. Consumer's Guide* to help consumers determine whether using small wind energy systems would be economically feasible for them and helps states customize the guides. WPA also sponsors small wind technical workshops, including Section 9006 workshops, and provides technical assistance.

Related Programs

In addition to the six program areas outlined above, WPA continues to work on wind project siting issues, including radar, with other agencies that have responsibilities for development on public lands and protection of wildlife. WPA team members also work on air quality, economic development research, projects on Federal lands, wind resource assessment, the wind and water nexus, and communications and outreach (including the extensive WPA Web site at www.windpoweringamerica.gov).

Through these joint efforts and many others, WPA continues to expand wind energy as a viable option for power generation.

www.windpoweringamerica.gov



DOE/GO-102008-2585 • April 2008

A Strong Energy Portfolio for a Strong America

Energy efficiency and clean, renewable energy will mean a stronger economy, a cleaner environment, and greater energy independence for America. Working with a wide array of state, community, industry, and university partners, the U.S. Department of Energy's Office of Energy Efficiency and Renewable Energy invests in a diverse portfolio of energy technologies.

Produced for the U.S. Department of Energy by the National Renewable Energy Laboratory, a DOE national laboratory

Printed with a renewable-source ink on paper containing at least 50% wastepaper, including 20% postconsumer waste

For more information contact:
EERE Information Center
1-877-EERE-INF (1-877-337-3463)
www.eere.energy.gov